	Application No.	Applicant(s)
Notice of Allowability	10/034,885	TEDESCO, MICHAEL A.
	Examiner	Art Unit
	DEBBIE M. LE	2168

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--

All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. **THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS.** This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

1. ☒ This communication is responsive to *8/16/05*.

2. ☒ The allowed claim(s) is/are *1,2,4-25,27-29,31-48,50-52,54-71,73-75,77-79,81-92,94-97,99,100 and 102-167 (now renumbered as 1-153)*.

3. ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

    a) ☐ All   b) ☐ Some*   c) ☐ None of the:

        1. ☐ Certified copies of the priority documents have been received.

        2. ☐ Certified copies of the priority documents have been received in Application No. _____ .

        3. ☐ Copies of the certified copies of the priority documents have been received in this national stage application from the

          International Bureau (PCT Rule 17.2(a)).

    * Certified copies not received: _____ .

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.
THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.

4. ☐ A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.

5. ☐ CORRECTED DRAWINGS (as "replacement sheets") must be submitted.

    (a) ☐ including changes required by the Notice of Draftsperson's Patent Drawing Review (PTO-948) attached

        1) ☐ hereto or 2) ☐ to Paper No./Mail Date _____.

    (b) ☐ including changes required by the attached Examiner's Amendment / Comment or in the Office action of

        Paper No./Mail Date _____.

    Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).

6. ☐ DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

Attachment(s)

1. ☒ Notice of References Cited (PTO-892)

2. ☐ Notice of Draftperson's Patent Drawing Review (PTO-948)

3. ☐ Information Disclosure Statements (PTO-1449 or PTO/SB/08), Paper No./Mail Date _____

4. ☐ Examiner's Comment Regarding Requirement for Deposit of Biological Material

5. ☐ Notice of Informal Patent Application (PTO-152)

6. ☒ Interview Summary (PTO-413), Paper No./Mail Date *11/11/05* .

7. ☒ Examiner's Amendment/Comment

8. ☒ Examiner's Statement of Reasons for Allowance

9. ☐ Other _____.

DETAILED ACTION

Drawings

The drawings were received on December 26, 2001. These drawings are

acknowledged and accepted.

EXAMINER'S AMENDMENT

An examiner's amendment to the record appears below. Should the changes

and/or additions be unacceptable to applicant, an amendment may be filed as provided

by 37 CFR 1.312. To ensure consideration of such an amendment, it MUST be

submitted no later than the payment of the issue fee.

Authorization for this examiner's amendment was given in a telephone interview

with Tony V. Pezzano (Reg. 38,271) on November 11, 2005.

The application has been amended as follows:

Please replace listing of claims prior version which was filed on August 16, 2005

with the new listing of claims version as follows:

Please **amend** claims 1, 4, 5, 14, 25, 27, 28, 31, 43, 48, 50, 51, 54, 55, 62, 71, 73, 74, 77, 85, 92, 94-97, 100, 102,103 and 105. Please **add** claims 106-167. Please **cancel** claims 3, 7, 26, 30, 34, 49, 53, 57, 72, 76, 80, 93, 98 and 101.

1. (Currently Amended) A method for controlling access to database information,

comprising:

        receiving a database query directed to a database engine;

initially evaluating at least one system performance characteristic associated with at least one database engine, selected from one or more of:

system management parameters of said at least one database engine, said system management parameters comprising one or more of estimated processor usage, estimated memory usage, input/output resource usage and/or disk resource usage for a system maintaining the database engine to process the query;

a user-access record of said at least one database engine, said user-access record comprising an assigned accessibility right of a user based on a class or category of a user, historical system resource requirements of the user's previous queries and the user's previously evaluated queries; and

the query to determine system usage of said at least one database engine, prior to submission of the query to the database engine, said evaluating of the database query based on one or more of:

a parameter of the query, a number of relational databases for the query, a size of a data field to be searched for the query, an availability of resources of the database engine, a number of relational database tables to be employed for the query, a limitation imposed on a size of a query result set, a number of columns of data to be returned in a query result set, a cost of a similar stored query and/or a number of function calls for the query; and

rejecting the query if the system usage surpasses a threshold value.

2. (Original) The method of claim 1, wherein said receiving further comprises:

receiving the database query from a user.

3. (Canceled)

4. (Currently Amended) The method of claim 1 3, further comprising:

assigning a score to the query based on said evaluating, wherein said rejecting occurs when the score surpasses the threshold value.

5. (Currently Amended) The method of claim 4, wherein said assigning comprises:

assigning a value to a plurality of system performance variables;

determining a cost of the query based on a weighted evaluation of ~~at least one~~ one or more of said variables.

6. (Original) The method of claim 3. further comprising:

storing the query and the determined cost of the query.

7. (Canceled)

8. (Original) The method of claim 1, wherein said threshold value is determined based on a category of a user submitting the query.

9. (Original) The method of claim 8, wherein the category of the user is determined based on a history of queries submitted by the user.

10. (Original) The method of claim 9, wherein said history of queries comprises histories of scores of previous queries submitted by the user.

11. (Original) The method of claim 8, wherein the category comprises one of a plurality of categories of increasing accessibility rights to search the database.

12. (Original) The method of claim 1, further comprising:

submitting the query to the search engine if the system usage is less than the threshold value.

13. (Original) The method of claim 1, wherein said rejecting further comprises:

editing the query so that the system usage is less than the threshold value; and

submitting the query to the database engine.

14. (Currently Amended) The method of claim 13, wherein said editing comprises ~~at least one~~ one or more of:

providing an alternate search parameter, and/or providing a limit on the number of results for the query.

15. (Original) The method of claim 13, further comprising:

transmitting a result of the query, after said submitting.

16. (Original) The method of claim 15, wherein said transmitting further comprises:

transmitting the result of the query to the user.

17. (Original) The method of claim 15, wherein said transmitting further comprises:

transmitting a portion of the result of the query to a user.

18. (Original) The method of claim 13, wherein said editing further comprises:

substantially optimizing the query for usage of system resources.

19. (Original) The method of claim 13, wherein said submitting comprises:

submitting the query to a second database engine.

20. (Original) The method of claim 1, wherein said rejecting comprises:

offering to provide a portion of a result of the rejected query to the user;

submitting the rejected query to the server; and

providing a portion of the result of the query to the user.

21. (Original) The method of claim 1, wherein said rejecting further comprises:

offering an alternative query in place of the rejected query.

22. (Original) The method of claim 1, wherein said receiving, evaluating and rejecting are performed by a screening server prior to submission of the query to a database engine.

23. (Original) The method of claim 1, wherein the database query comprises structured query language.

24. (Original) The method of claim 1, further comprising:

storing the query.

25. (Currently Amended) A computer readable medium encoded with processing instructions for implementing a method, performed by a computer, for controlling access to database information, the method comprising:

receiving a database query directed to a database engine;

initially evaluating at least one system performance characteristic associated with at least one database engine, selected from one or more of:

system management parameters of said at least one database engine, said system management parameters comprising one or more of estimated

processor usage, estimated memory usage, input/output resource usage and/or disk resource usage for a system maintaining the database engine to process the query;

a user-access record of said at least one database engine, said user-access record comprising an assigned accessibility right of a user based on a class or category of a user, historical system resource requirements of the user's previous queries and the user's previously evaluated queries; and

the query to determine system usage of said at least one database engine, prior to submission of the query to the database engine, said evaluating of the database query based on one or more of:

a parameter of the query, a number of relational databases for the query, a size of a data field to be searched for the query, an availability of resources of the database engine, a number of relational database tables to be employed for the query, a limitation imposed on a size of a query result set, a number of columns of data to be returned in a query result set, a cost of a similar stored query and/or a number of function calls for the query; and

rejecting the query if the system usage surpasses a threshold value.

26. (Canceled)

27. (Currently Amended) An apparatus for controlling access to database information, comprising:

a processor; and

a memory in communication with the processor, the memory for storing a plurality of processing instructions enabling the processor to:

receive a database query directed to a database engine;

initially evaluating at least one system performance characteristic associated with at least one database engine, selected from one or more of:

system management parameters of said at least one database engine, said system management parameters comprising one or more of estimated processor usage, estimated memory usage, input/output resource usage and/or disk resource usage for a system maintaining the database engine to process the query;

a user-access record <u>of said at least one database engine, said</u> <u>user-access record comprising an assigned accessibility right of a user based on a</u> <u>class or category of a user, historical system resource requirements of the user's</u> <u>previous queries and the user's previously evaluated queries; and</u>

the query to determine system usage <u>of said at least one database</u> <u>engine,</u> prior to submission of the query to the database engine<u>, said evaluating of the</u> <u>database query based on one or more of:</u>

<u>a parameter of the query, a number of relational databases</u> <u>for the query, a size of a data field to be searched for the query, an availability of</u> <u>resources of the database engine, a number of relational database tables to be</u> <u>employed for the query, a limitation imposed on a size of a query result set, a number of</u> <u>columns of data to be returned in a query result set, a cost of a similar stored query</u> <u>and/or a number of function calls for the query;</u>

reject the query if the system usage surpasses a threshold value.

28. (Currently Amended) A method for controlling access to database information, comprising:

receiving a database query directed to a database engine;

<u>initially</u> evaluating at least one system performance characteristic associated with at least one database engine<u>, selected from one or more of:</u>

system management parameters <u>of said at least one database</u> <u>engine, said system management parameters comprising one or more of estimated</u> <u>processor usage, estimated memory usage, input/output resource usage and/or disk</u> <u>resource usage for a system maintaining the database engine to process the query;</u>

a user-access record <u>of said at least one database engine, said</u> <u>user-access record comprising an assigned accessibility right of a user based on a</u> <u>class or category of a user, historical system resource requirements of the user's</u> <u>previous queries and the user's previously evaluated queries; and</u>

the query to determine system usage <u>of said at least one database</u> <u>engine,</u> prior to submission of the query to the database engine<u>, said evaluating of the</u> <u>database query based on one or more of:</u>

a parameter of the query, a number of relational databases
for the query, a size of a data field to be searched for the query, an availability of
resources of the database engine, a number of relational database tables to be
employed for the query, a limitation imposed on a size of a query result set, a number of
columns of data to be returned in a query result set, a cost of a similar stored query
and/or a number of function calls for the query; and

submitting the query to the database engine if the system usage does not
surpass a threshold value.

29. (Original) The method of claim 28, wherein said receiving further
comprises:

receiving the database query from a user.

30. (Canceled)

31. (Currently Amended) The method of claim 28 30, further comprising:

assigning a score to the query based on said evaluating, wherein said
submitting occurs when the score is less than the threshold value.

32. (Original) The method of claim 31, wherein said assigning comprises:

assigning a fixed value to a plurality of system performance variables;

determining a cost of the system query based on a weighted evaluation of
each assigned variables.

33. (Original) The method of claim 31, further comprising:

storing the query and the determined cost of the query.

34. (Canceled)

35. (Original) The method of claim 28, wherein said threshold value is
determined based on a category of a user submitting the query.

36. (Original) The method of claim 35, wherein the category of the user is
determined based on a history of queries submitted by the user.

37. (Original) The method of claim 36, wherein said history of queries
comprises histories of scores of previous queries submitted by the user.

38. (Original) The method of claim 35, wherein the category comprises
one of a plurality of categories of increasing accessibility rights to search the database.

39. (Original) The method of claim 28, further comprising:

rejecting the query if the system usage surpasses the threshold value.

40. (Original) The method of claim 39, wherein said rejecting comprises:

offering to provide a portion of a result of the rejected query to the user;

submitting the rejected query to the server; and

providing a portion of the result of the query to the user.

41. (Original) The method of claim 39, further comprising:

offering an alternative query to the user after said rejecting.

42. (Original) The method of claim 28, further comprising:

editing the query if the system usage surpasses the threshold value.

43. (Currently Amended) The method of claim 42, wherein said editing

further comprises at least one one or more of:

providing an alternate search parameter, and/or providing a limit on the

number of results for the query.

44. (Original) The method of claim 28, further comprising:

transmitting a result of the search after said submitting.

45. (Original) The method of claim 28, wherein said receiving, evaluating

and submitting are performed by a screening server that receives queries directed to a

database engine.

46. (Original) The method of claim 28, wherein the database query

comprises structured query language.

47. (Original) The method of claim 28, further comprising:

storing the query.

48. (Currently Amended) A computer-readable medium encoded with

processing instructions for implementing a method, performed by a computer, for

controlling access to database information, the method comprising:

receiving a database query directed to a database engine;

initially evaluating at least one system performance characteristic

associated with at least one database engine, selected from one or more of:

system management parameters of said at least one database engine, said system management parameters comprising one or more of estimated processor usage, estimated memory usage, input/output resource usage and/or disk resource usage for a system maintaining the database engine to process the query;

a user-access record of said at least one database engine, said user-access record comprising an assigned accessibility right of a user based on a class or category of a user, historical system resource requirements of the user's previous queries and the user's previously evaluated queries; and

the query to determine system usage of said at least one database engine, prior to submission of the query to the database engine, said evaluating of the database query based on one or more of:

a parameter of the query, a number of relational databases for the query, a size of a data field to be searched for the query, an availability of resources of the database engine, a number of relational database tables to be employed for the query, a limitation imposed on a size of a query result set, a number of columns of data to be returned in a query result set, a cost of a similar stored query and/or a number of function calls for the query; and

submitting the query to the database engine if the system usage does not surpass a threshold value.

49. (Canceled)

50. (Currently Amended) An apparatus for controlling access to database information, comprising:

a processor; and

a memory in communication with the processor, the memory for storing a plurality of processing instructions directing the processor to:

receive a database query directed to a database engine;

initially evaluating at least one system performance characteristic associated with at least one database engine, selected from one or more of:

system management parameters of said at least one database engine, said system management parameters comprising one or more of estimated

processor usage, estimated memory usage, input/output resource usage and/or disk resource usage for a system maintaining the database engine to process the query;

a user-access record of said at least one database engine, said user-access record comprising an assigned accessibility right of a user based on a class or category of a user, historical system resource requirements of the user's previous queries and the user's previously evaluated queries; and

the query to determine system usage of said at least one database engine, prior to submission of the query to the database engine, said evaluating of the database query based on one or more of:

a parameter of the query, a number of relational databases for the query, a size of a data field to be searched for the query, an availability of resources of the database engine, a number of relational database tables to be employed for the query, a limitation imposed on a size of a query result set, a number of columns of data to be returned in a query result set, a cost of a similar stored query and/or a number of function calls for the query; and

submit the query to the database engine if the system usage does not surpass a threshold value.

51. (Currently Amended) A method for controlling access to database information, comprising:

receiving a database query directed to a database engine;

initially evaluating at least one system performance characteristic associated with at least one database engine, selected from one or more of:

system management parameters of said at least one database engine, said system management parameters comprising one or more of estimated processor usage, estimated memory usage, input/output resource usage and/or disk resource usage for a system maintaining the database engine to process the query;

a user-access record of said at least one database engine, said user-access record comprising an assigned accessibility right of a user based on a class or category of a user, historical system resource requirements of the user's previous queries and the user's previously evaluated queries; and

the query to determine system usage <u>of said at least one database engine,</u> prior to submission of the query to the database engine<u>, said evaluating of the database query based on one or more of:</u>

<u>a parameter of the query, a number of relational databases for the query, a size of a data field to be searched for the query, an availability of resources of the database engine, a number of relational database tables to be employed for the query, a limitation imposed on a size of a query result set, a number of columns of data to be returned in a query result set, a cost of a similar stored query and/or a number of function calls for the query;</u> and

editing the query if the system usage surpasses a threshold value.

52. (Original) The method of claim 51, wherein said receiving further comprises:

receiving the database query from a user.

53. (Canceled)

54. (Currently Amended) The method of claim <u>51</u>~~53~~, further comprising:

assigning a score to the query based on said evaluating, wherein said rejecting occurs when the score surpasses the threshold value.

55. (Currently Amended) The method of claim 54, wherein said assigning comprises:

assigning a value to a plurality of system performance variables;

determining a cost of the system query based on a weighted evaluation of ~~at least one~~ <u>one or more</u> of said variables.

56. (Original) The method of claim 54, further comprising:

storing the query and the determined cost of the query.

57. (Canceled)

58. (Original) The method of claim 51, wherein said threshold value is determined based on a category of a user submitting the query.

59. (Original) The method of claim 58, wherein the category of the user is determined based on a history of queries submitted by the user.

60. (Original) The method of claim 59, wherein said history of queries comprises histories of scores of previous queries submitted by the user.

61. (Original) The method of claim 58, wherein the category comprises one of a plurality of categories of increasing accessibility rights to search the database.

62. (Currently Amended) The method of claim 51, wherein said editing further comprises at least one one or more of:

providing an alternate search parameter, and/or providing a limit on the number of results for the query.

63. (Original) The method of claim 62, further comprising:

submitting the query to the database engine after said editing.

64. (Original) The method of claim 63, further comprising:

transmitting a result of the query after said submitting.

65. (Original) The method of claim 51, further comprising:

submitting the edited query to the database engine if the system usage surpasses a threshold value; and

transmitting a result based on the query after said submitting.

66. (Original) The method of claim 51, wherein said receiving, evaluating and editing are performed by a screening server that intercepts queries directed to a database engine.

67. (Original) The method of claim 51, wherein said editing further comprises:
substantially optimizing the query for usage of system resources.

68. (Original) The method of claim 51, wherein said editing comprises:

offering to provide a portion of a result of the rejected query to the user; submitting the rejected query to the server; and

providing a portion of the result of the query to the user.

69. (Original) The method of claim 51, wherein the database query comprises structured query language.

70. (Original) The method of claim 51, further comprising:

storing the query.

71. (Currently Amended) A computer-readable medium encoded with processing instructions for implementing a method, performed by a computer, for controlling access to database information, the method comprising:

receiving a database query directed to a database engine;

initially evaluating at least one system performance characteristic associated with at least one database engine, selected from one or more of:

system management parameters of said at least one database engine, said system management parameters comprising one or more of estimated processor usage, estimated memory usage, input/output resource usage and/or disk resource usage for a system maintaining the database engine to process the query;

a user-access record of said at least one database engine, said user-access record comprising an assigned accessibility right of a user based on a class or category of a user, historical system resource requirements of the user's previous queries and the user's previously evaluated queries; and

the query to determine system usage of said at least one database engine, prior to submission of the query to the database engine, said evaluating of the database query based on one or more of:

a parameter of the query, a number of relational databases for the query, a size of a data field to be searched for the query, an availability of resources of the database engine, a number of relational database tables to be employed for the query, a limitation imposed on a size of a query result set, a number of columns of data to be returned in a query result set, a cost of a similar stored query and/or a number of function calls for the query; and

editing the query if the system usage surpasses a threshold value.

72. (Canceled)

73. (Currently Amended) An apparatus for controlling access to database information, comprising:

a processor; and

a memory in communication with the processor, the memory for storing a plurality of processing instructions directing the processor to:

receive a database query directed to a database engine;

initially evaluating at least one system performance characteristic associated with at least one database engine, selected from one or more of:

system management parameters of said at least one database engine, said system management parameters comprising one or more of estimated processor usage, estimated memory usage, input/output resource usage and/or disk resource usage for a system maintaining the database engine to process the query;

a user-access record of said at least one database engine, said user-access record comprising an assigned accessibility right of a user based on a class or category of a user, historical system resource requirements of the user's previous queries and the user's previously evaluated queries; and

the query to determine system usage of said at least one database engine, prior to submission of the query to the database engine, said evaluating of the database query based on one or more of:

a parameter of the query, a number of relational databases for the query, a size of a data field to be searched for the query, an availability of resources of the database engine, a number of relational database tables to be employed for the query, a limitation imposed on a size of a query result set, a number of columns of data to be returned in a query result set, a cost of a similar stored query and/or a number of function calls for the query; and

edit the query if the system usage surpasses a threshold value.

74. (Currently Amended) A method for controlling access to database information, comprising:

receiving a database query directed to a database engine;

initially evaluating at least one system performance characteristic associated with at least one database engine, selected from one or more of:

system management parameters of said at least one database engine, said system management parameters comprising one or more of estimated processor usage, estimated memory usage, input/output resource usage and/or disk resource usage for a system maintaining the database engine to process the query;

a user-access record of said at least one database engine, said

user-access record comprising an assigned accessibility right of a user based on a

class or category of a user, historical system resource requirements of the user's

previous queries and the user's previously evaluated queries; and

the query to determine system usage of said at least one database

engine, prior to submission of the query to the database engine, said evaluating of the

database query based on one or more of:

a parameter of the query, a number of relational databases

for the query, a size of a data field to be searched for the query, an availability of

resources of the database engine, a number of relational database tables to be

employed for the query, a limitation imposed on a size of a query result set, a number of

columns of data to be returned in a query result set, a cost of a similar stored query

and/or a number of function calls for the query; and

if the system usage surpasses a threshold value, performing at least one

one or more of the following: submitting the query to the database engine with a limit on

a number of returns responsive to the query, editing the query, and/or rejecting the

query.

75. (Original) The method of claim 74, wherein said receiving further

comprises:

receiving the database query from a user.

76. (Canceled)

77. (Currently Amended) The method of claim 74 76, further comprising:

assigning a score to the query based on said evaluating, wherein said

rejecting occurs when the score surpasses the threshold value.

78. (Original) The method of claim 77, wherein said assigning comprises:

assigning a fixed value to a plurality of system performance variables;

determining a cost of the system query based on a weighted evaluation of

each assigned variables.

79. (Original) The method of claim 77, further comprising:

storing the query and the determined cost of the query.

80. (Canceled)

81. (Original) The method of claim 74, wherein said threshold value is determined based on a category of a user submitting the query.

82. (Original) The method of claim 81, wherein the category of the user is determined based on a history of queries submitted by the user.

83. (Original) The method of claim 82, wherein said history of queries comprises histories of scores of previous queries submitted by the user.

84. (Original) The method of claim 81, wherein the category comprises one of a plurality of categories of increasing accessibility rights to search the database.

85. (Currently Amended) The method of claim 74, wherein said editing comprises at least one one or more of:

providing an alternate search parameter, and/or providing a limit on the number of results for the query.

86. (Original) The method of claim 74, further comprises:

submitting the query to the database engine if the system usage is less than the threshold value.

87. (Original) The method of claim 74, further comprising:

determining a result based on the query; and

transmitting the result to a party from which the query originated.

88. (Original) The method of claim 74, wherein said receiving, evaluating and editing are performed by a screening server that intercepts queries directed to a database engine.

89. (Original) The method of claim 74, wherein said editing further comprises:

substantially optimizing the query for usage of system resources.

90. (Original) The method of claim 74, wherein said rejecting comprises:

offering to provide a portion of a result of the rejected query to the user;

submitting the rejected query to the server; and

providing a portion of the result of the query to the user.

91. (Original) The method of claim 74, wherein the database query comprises structured query language.

92. (Currently Amended) A computer-readable medium encoded with processing instructions for implementing a method, performed by a computer, for controlling access to database information, the method comprising:

receiving a database query directed to a database engine;

initially evaluating at least one system performance characteristic associated with at least one database engine, selected from one or more of:

system management parameters of said at least one database engine, said system management parameters comprising one or more of estimated processor usage, estimated memory usage, input/output resource usage and/or disk resource usage for a system maintaining the database engine to process the query;

a user-access record of said at least one database engine, said user-access record comprising an assigned accessibility right of a user based on a class or category of a user, historical system resource requirements of the user's previous queries and the user's previously evaluated queries; and

the query to determine system usage of said at least one database engine, prior to submission of the query to the database engine, said evaluating of the database query based on one or more of:

a parameter of the query, a number of relational databases for the query, a size of a data field to be searched for the query, an availability of resources of the database engine, a number of relational database tables to be employed for the query, a limitation imposed on a size of a query result set, a number of columns of data to be returned in a query result set, a cost of a similar stored query and/or a number of function calls for the query; and

if the system usage surpasses a threshold value, performing at least one one or more of the following: submitting the query to the database engine with a limit on a number of returns responsive to the query, editing the query, and/or rejecting the query.

93. (Canceled)

94. (Currently Amended) An apparatus for controlling access to database information, comprising:

a processor; and

a memory in communication with the processor, the memory for storing a plurality of processing instructions directing the processor to:

receive a database query directed to a database engine;

initially evaluating at least one system performance characteristic associated with at least one database engine, selected from one or more of:

system management parameters of said at least one database engine, said system management parameters comprising one or more of estimated processor usage, estimated memory usage, input/output resource usage and/or disk resource usage for a system maintaining the database engine to process the query;

a user-access record of said at least one database engine, said user-access record comprising an assigned accessibility right of a user based on a class or category of a user, historical system resource requirements of the user's previous queries and the user's previously evaluated queries; and

the query to determine system usage of said at least one database engine, prior to submission of the query to the database engine, said evaluating of the database query based on one or more of:

a parameter of the query, a number of relational databases for the query, a size of a data field to be searched for the query, an availability of resources of the database engine, a number of relational database tables to be employed for the query, a limitation imposed on a size of a query result set, a number of columns of data to be returned in a query result set, a cost of a similar stored query and/or a number of function calls for the query; and

perform at least one one or more of the following, if the system usage surpasses a threshold value: submit the query to the database engine with a limit on a number of returns responsive to the query, edit the query, and/or reject the query.

95. (Currently Amended) A method for querying a database, comprising:

initially evaluating at least one system performance characteristic
associated with at least one database engine, selected from one or more of:

system management parameters of said at least one database
engine, said system management parameters comprising one or more of estimated
processor usage, estimated memory usage, input/output resource usage and/or disk
resource usage for a system maintaining the database engine to process the query;

a user-access record of said at least one database engine, said
user-access record comprising an assigned accessibility right of a user based on a
class or category of a user, historical system resource requirements of the user's
previous queries and the user's previously evaluated queries; and

the query to determine system usage of said at least one database
engine, prior to submission of the query to the database engine, said evaluating of the
database query based on one or more of:

a parameter of the query, a number of relational databases
for the query, a size of a data field to be searched for the query, an availability of
resources of the database engine, a number of relational database tables to be
employed for the query, a limitation imposed on a size of a query result set, a number of
columns of data to be returned in a query result set, a cost of a similar stored query
and/or a number of function calls for the query;

transmitting a query to a search engine; and

receiving one of: a rejection of the query and a revised search criterion,
prior to receiving a search result based on the query.

96. (Currently Amended) A method for querying a database, comprising:

initially evaluating at least one system performance characteristic
associated with at least one database engine, selected from one or more of:

system management parameters of said at least one database
engine, said system management parameters comprising one or more of estimated
processor usage, estimated memory usage, input/output resource usage and/or disk
resource usage for a system maintaining the database engine to process the query;

a user-access record of said at least one database engine, said user-access record comprising an assigned accessibility right of a user based on a class or category of a user, historical system resource requirements of the user's previous queries and the user's previously evaluated queries; and

the query to determine system usage of said at least one database engine, prior to submission of the query to the database engine, said evaluating of the database query based on one or more of:

a parameter of the query, a number of relational databases for the query, a size of a data field to be searched for the query, an availability of resources of the database engine, a number of relational database tables to be employed for the query, a limitation imposed on a size of a query result set, a number of columns of data to be returned in a query result set, a cost of a similar stored query and/or a number of function calls for the query;

transmitting a query to a database engine; and

receiving one of: a rejection of the query and a revised search criterion, prior to submission of the query to the database engine.

97. (Currently Amended) A method for selectively controlling queries to a database comprising:

establishing a threshold value for system usage for a database query;

~~activating a query screening process for a database engine wherein the system usage for the database query;~~ and

initially evaluating at least one system performance characteristic associated with at least one database engine, selected from one or more of:

system management parameters of said at least one database engine, said system management parameters comprising one or more of estimated processor usage, estimated memory usage, input/output resource usage and/or disk resource usage for a system maintaining the database engine to process the query;

a user-access record of said at least one database engine, said user-access record comprising an assigned accessibility right of a user based on a

class or category of a user, historical system resource requirements of the user's previous queries and the user's previously evaluated queries; and

the query to determine system usage of said at least one database engine, prior to submission of the query to the database engine, said evaluating of the database query based on one or more of:

a parameter of the query, a number of relational databases for the query, a size of a data field to be searched for the query, an availability of resources of the database engine, a number of relational database tables to be employed for the query, a limitation imposed on a size of a query result set, a number of columns of data to be returned in a query result set, a cost of a similar stored query and/or a number of function calls for the query;

if the system usage surpasses the threshold value, a query screening process performs one or more of the following: the query is submitted to the database engine with a limit on a number of returns responsive to the query, the query is edited, and/or the query is rejected.

98. (Canceled)

99. (Original) The method of claim 97, wherein the database query comprises structured query language.

100. (Currently Amended) A computer-readable medium encoded with processing instructions for implementing a method, performed by a computer, for selectively controlling queries to a database, the method comprising:

establishing a threshold value for system usage for a database query;

~~activating a query screening process for a database engine wherein the system usage for the database query;~~ and

initially evaluating at least one system performance characteristic associated with at least one database engine, selected from one or more of:

system management parameters of said at least one database engine, said system management parameters comprising one or more of estimated processor usage, estimated memory usage, input/output resource usage and/or disk resource usage for a system maintaining the database engine to process the query;

a user-access record of said at least one database engine, said user-access record comprising an assigned accessibility right of a user based on a class or category of a user, historical system resource requirements of the user's previous queries and the user's previously evaluated queries; and

the query to determine system usage of said at least one database engine, prior to submission of the query to the database engine, said evaluating of the database query based on one or more of:

a parameter of the query, a number of relational databases for the query, a size of a data field to be searched for the query, an availability of resources of the database engine, a number of relational database tables to be employed for the query, a limitation imposed on a size of a query result set, a number of columns of data to be returned in a query result set, a cost of a similar stored query and/or a number of function calls for the query;

if the system usage surpasses the threshold value, a query screening process performs one or more of the following: the query is submitted to the database engine with a limit on a number of returns responsive to the query, the query is edited, and/or the query is rejected.

101. (Canceled)

102. (Currently Amended) An apparatus for selectively controlling queries to a database, comprising:

a processor; and

a memory in communication with the processor, the memory for storing a plurality of processing instructions directing the processor to:

establish a threshold value for system usage for a database query;

activate a query screening process for a database engine wherein the system usage for the database query; and

initially evaluating at least one system performance characteristic associated with at least one database engine, selected from one or more of:

system management parameters of said at least one database engine, said system management parameters comprising one or more of estimated

processor usage, estimated memory usage, input/output resource usage and/or disk
resource usage for a system maintaining the database engine to process the query;

a user-access record of said at least one database engine, said
user-access record comprising an assigned accessibility right of a user based on a
class or category of a user, historical system resource requirements of the user's
previous queries and the user's previously evaluated queries; and

the query to determine system usage of said at least one database
engine, prior to submission of the query to the database engine, said evaluating of the
database query based on one or more of:

a parameter of the query, a number of relational databases
for the query, a size of a data field to be searched for the query, an availability of
resources of the database engine, a number of relational database tables to be
employed for the query, a limitation imposed on a size of a query result set, a number of
columns of data to be returned in a query result set, a cost of a similar stored query
and/or a number of function calls for the query;

if the system usage surpasses the threshold value, a query screening
process performs one or more of the following: the query is submitted to the database
engine with a limit on a number of returns responsive to the query, the query is edited,
and/or the query is rejected.

103. (Currently Amended) A method for controlling access to database
information performed by a screening server, comprising:

receiving, from a user terminal, a database query directed to a database
engine;

initially evaluating at least one system performance characteristic
associated with at least one database engine, selected from one or more of:

system management parameters of said at least one database
engine, said system management parameters comprising one or more of estimated
processor usage, estimated memory usage, input/output resource usage and/or disk
resource usage for a system maintaining the database engine to process the query;

a user-access record of said at least one database engine, said
user-access record comprising an assigned accessibility right of a user based on a
class or category of a user, historical system resource requirements of the user's
previous queries and the user's previously evaluated queries; and

the database query to determine system usage of the query at the
database engine, prior to submission of the query to the database engine, said
evaluating of the database query based on at least one one or more of:

a parameter of the query, a number of relational databases for the query,
a size of a data field to be searched for the query, an availability of resources of a
system maintaining the database engine, a number of relational database tables to be
employed for the query, a limitation imposed on a size of a query result set, a number of
columns of data to be returned in a query result set, a cost of a similar stored query
and/or a number of function calls for the query;

determining a threshold value for system usage of the database engine,
wherein the threshold value is based on at least one one or more of: estimated
processor usage, estimated memory usage, input/output resource usage and disk
resource usage of the database engine; and/or

if the system usage surpasses a threshold value, performing at least one
one or more of the following: submitting the query to the database engine with a limit on
a number of returns responsive to the query, editing the query, and/or rejecting the
query.

104. (Original) The method of claim 103, further comprising:

monitoring the actual system usage of the query after submission to the
database engine; and

storing the database query and the actual system usage.

105. (Currently Amended) A method for controlling access to database
information performed by a screening server, comprising:

receiving, from a user terminal, a structured query language (SQL) query
directed to a separate database engine;

initially evaluating at least one system performance characteristic associated with at least one database engine, selected from one or more of:

system management parameters of said at least one database engine, said system management parameters comprising one or more of estimated processor usage, estimated memory usage, input/output resource usage and/or disk resource usage for a system maintaining the database engine to process the query;

a user-access record of said at least one database engine, said user-access record comprising an assigned accessibility right of a user based on a class or category of a user, historical system resource requirements of the user's previous queries and the user's previously evaluated queries; and

the database query to determine system usage of the query at the database engine, prior to submission of the query to the database engine, said evaluating of the database query based on at least one one or more of:

a parameter of the SQL query, a number of relational databases for the SQL query, a size of a data field to be searched for the SQL query, an availability of resources of the database engine, a number of relational database tables to be employed for the SQL query, a limitation imposed on a size of a query result set, a number of columns of data to be returned in a query result set, a cost of a similar stored SQL query and/or a number of function calls for the query;

determining a threshold value for system usage of the database engine, wherein the threshold value is based on at least one one or more of: estimated processor usage, estimated memory usage, input/output resource usage and/or disk resource usage of the database engine;

if the system usage surpasses a threshold value, performing at least one one or more of the following: submitting the SQL query to the database engine with a limit on a number of returns responsive to the SQL query, editing the SQL query, and/or rejecting the SQL query;

monitoring the actual system usage of the SQL query after submission to the database engine; and

storing the SQL query and the actual system usage.

NEW CLAIMS:

106. (New) The computer-readable medium of claim 25, further comprising:

assigning a score to the query based on said evaluating, wherein said rejecting occurs when the score surpasses the threshold value.

107. (New) The computer-readable medium of claim 25, wherein said assigning comprises:

assigning a value to a plurality of system performance variables;

determining a cost of the query based on a weighted evaluation of one or more of said variables.

108. (New) The computer-readable medium of claim 25, further comprising:

storing the query and the determined cost of the query.

109. (New) The computer-readable medium of claim 25, further comprising:

submitting the query to the search engine if the system usage is less than the threshold value.

110. (New) The computer-readable medium of claim 25, wherein said rejecting further comprises:

editing the query so that the system usage is less than the threshold value; and

submitting the query to the database engine.

111. (New) The computer-readable medium of claim 25, wherein said editing comprises one or more of:

providing an alternate search parameter, and/or providing a limit on the number of results for the query.

112. (New) The computer-readable medium of claim 110, further comprising:

transmitting a result of the query, after said submitting.

113. (New) The apparatus of claim 27, wherein said threshold value is determined based on a category of a user submitting the query.

114. (New) The apparatus of claim 113, wherein the category of the user is determined based on a history of queries submitted by the user.

115. (New) The apparatus of claim 114, wherein said history of queries comprises histories of scores of previous queries submitted by the user.

116. (New) The apparatus of claim 113, wherein the category comprises one of a plurality of categories of increasing accessibility rights to search the database.

117. (New) A system for screening queries on a query-by-query basis, comprising:

receiving a database query directed to a database engine;

initially evaluating at least one system performance characteristic associated with at least one database engine, selected from one or more of:

system management parameters of said at least one database engine, said system management parameters comprising one or more of estimated processor usage, estimated memory usage, input/output resource usage and/or disk resource usage for a system maintaining the database engine to process the query;

a user-access record of said at least one database engine, said user-access record comprising an assigned accessibility right of a user based on a class or category of a user, historical system resource requirements of the user's previous queries and the user's previously evaluated queries; and

the query to determine system usage of said at least one database engine, prior to submission of the query to the database engine, said evaluating of the database query based on one or more of:

a parameter of the query, a number of relational databases for the query, a size of a data field to be searched for the query, an availability of resources of the database engine, a number of relational database tables to be employed for the query, a limitation imposed on a size of a query result set, a number of

columns of data to be returned in a query result set, a cost of a similar stored query and/or a number of function calls for the query; and

rejecting said query if the system usage surpasses a threshold value.

118. (New) The system of claim 117, wherein said receiving further comprises:

receiving the database query from a user.

119. (New) The system of claim 117, further comprising:

submitting the query to the search engine if the system usage is less than the threshold value.

120. (New) The system of claim 117, wherein said rejecting further comprises:

editing the query so that the system usage is less than the threshold value; and submitting the query to the database engine.

121. (New) The system of claim 120, wherein said editing comprises one or more of:

providing an alternate search parameter, and/or providing a limit on the number of results for the query.

122. (New) The system of claim 120, further comprising:

transmitting a result of the query, after said submitting.

123. (New) The system of claim 122, wherein said transmitting further comprises:

transmitting a portion of the result of the query to a user.

124. (New) The system of claim 120, wherein said editing further comprises:

substantially optimizing the query for usage of system resources.

125. (New) The system of claim 120, wherein said submitting comprises:

submitting the query to a second database engine.

126. (New) The system of claim 117, wherein said rejecting comprises:

offering to provide a portion of a result of the rejected query to the user;

submitting the rejected query to the server; and

providing a portion of the result of the query to the user.

127. (New) The system of claim 117, wherein said rejecting further comprises:

offering an alternative query in place of the rejected query.

128. (New) The system of claim 117, wherein said receiving, evaluating and rejecting are performed by a screening server prior to submission of the query to a database engine.

129. (New) The system of claim 117, wherein the database query comprises structured query language.

130. (New) The system of claim 117, further comprising:

storing the query.

131. (New) The computer-readable medium of claim 48, further comprising:

rejecting the query if the system usage surpasses the threshold value.

132. (New) The computer-readable medium of claim 131, wherein said rejecting further comprises:

offering to provide a portion of a result of the rejected query to the user; submitting the rejected query to the server; and providing a portion of the result of the query to the user.

133. (New) The computer-readable medium of claim 131, further comprising:

offering an alternative query to the user after said rejecting.

134. (New) The computer-readable medium of claim 48, further comprising:

editing the query if the system usage surpasses the threshold value.

135. (New) The computer-readable medium of claim 134, wherein said editing further comprises one or more of:

providing an alternate search parameter, and/or providing a limit on the number of results for the query.

136. (New) The computer-readable medium of claim 48, further comprising:

transmitting a result of the search after said submitting.

137. (New) The apparatus of claim 50, wherein said threshold value is determined based on a category of a user submitting the query.

138.(New) The apparatus of claim 137, wherein the category comprises one of a plurality of categories of increasing accessibility rights to search the database.

139.(New) The apparatus of claim 50, further comprising means for rejecting the query if the system usage surpasses the threshold value.

140. (New) A system for screening queries on a query-by-query basis, comprising:

receiving a database query directed to a database engine;

initially evaluating at least one system performance characteristic associated with at least one database engine, selected from one or more of:

system management parameters of said at least one database engine, said system management parameters comprising one or more of estimated processor usage, estimated memory usage, input/output resource usage and/or disk resource usage for a system maintaining the database engine to process the query;

a user-access record of said at least one database engine, said user-access record comprising an assigned accessibility right of a user based on a class or category of a user, historical system resource requirements of the user's previous queries and the user's previously evaluated queries; and

the query to determine system usage of said at least one database engine, prior to submission of the query to the database engine, said evaluating of the database query based on one or more of:

a parameter of the query, a number of relational databases for the query, a size of a data field to be searched for the query, an availability of resources of the database engine, a number of relational database tables to be employed for the query, a limitation imposed on a size of a query result set, a number of

columns of data to be returned in a query result set, a cost of a similar stored query and/or a number of function calls for the query; and

submitting said query to the database engine if the system usage does not surpass a threshold value.

141. (New) The system of claim 140, wherein said receiving further comprises:

receiving the database query from a user.

142. (New) The system of claim 140, further comprising:

editing the query if the system usage surpasses the threshold value.

143. (New) The system of claim 142, wherein said editing further comprises one or more of:

providing an alternate search parameter, and/or providing a limit on the number of results for the query.

144. (New) The system of claim 140, further comprising:

transmitting a result of the search after said submitting.

145. (New) The system of claim 140, wherein said receiving, evaluating and submitting are performed by a screening server that receives queries directed to a database engine.

146. (New) The computer-readable medium of claim 71, further comprising:

assigning a score to the query based on said evaluating, wherein said rejecting occurs when the score surpasses the threshold value.

147. (New) The computer-readable medium of claim 146, wherein said assigning comprises:

assigning a value to a plurality of system performance variables;

determining a cost of the based on a weighted evaluation of one or more of said variables.

148. (New) The computer-readable medium of claim 71, further comprising:

storing the query and the determined cost of the query.

149. (New) The computer-readable medium of claim 71, wherein said receiving, evaluating and editing are performed by a screening server that intercepts queries directed to a database engine.

150. (New) The computer-readable medium of claim 71, wherein said editing further comprises:
substantially optimizing the query for usage of system resources.

151. (New) The computer-readable medium of claim 71, wherein said editing comprises:
offering to provide a portion of a result of the rejected query to the user;
submitting the rejected query to the server; and
providing a portion of the result of the query to the user.

152.(New) The apparatus of claim 73, wherein said threshold value is determined based on a category of a user submitting the query.

153.(New) The apparatus of claim 152, wherein the category of the user is determined based on a history of queries submitted by the user.

154.(New) The apparatus of claim 153, wherein said history of queries comprises histories of scores of previous queries submitted by the user.

155.(New) The apparatus of claim 153, wherein the category comprises one of a plurality of categories of increasing accessibility rights to search the database.

156. (New) A system for screening queries on a query-by-query basis, comprising:
receiving a database query directed to a database engine;
initially evaluating at least one system performance characteristic associated with at least one database engine, selected from one or more of:
system management parameters of said at least one database engine, said system management parameters comprising one or more of estimated processor usage, estimated memory usage, input/output resource usage and/or disk resource usage for a system maintaining the database engine to process the query;
a user-access record of said at least one database engine, said user-access record comprising an assigned accessibility right of a user based on a

class or category of a user, historical system resource requirements of the user's previous queries and the user's previously evaluated queries; and

the query to determine system usage of said at least one database engine, prior to submission of the query to the database engine, said evaluating of the database query based on one or more of:

a parameter of the query, a number of relational databases for the query, a size of a data field to be searched for the query, an availability of resources of the database engine, a number of relational database tables to be employed for the query, a limitation imposed on a size of a query result set, a number of columns of data to be returned in a query result set, a cost of a similar stored query and/or a number of function calls for the query; and

editing said query if the system usage surpasses a threshold value.

157. (New) The system of claim 156, wherein said receiving further comprises:

receiving the database query from a user.

158. (New) The system of claim 156, wherein said editing further comprises one or more of:

providing an alternate search parameter, and/or providing a limit on the number of results for the query.

159. (New) The computer-readable medium of claim 92, further comprising:

assigning a score to the query based on said evaluating, wherein said rejecting occurs when the score surpasses the threshold value.

160. (New) The computer-readable medium of claim 159, wherein said assigning comprises:

assigning a fixed value to a plurality of system performance variables;

determining a cost of the system query based on a weighted evaluation of each assigned variables.

161. (New) The computer-readable medium of claim 159, further comprising:

storing the query and the determined cost of the query.

162. (New) The computer-readable medium of claim 92, wherein said editing comprises one or more of:

providing an alternate search parameter, and providing a limit on the number of results for the query.

163. (New) A system for screening queries on a query-by-query basis, comprising:

receiving a database query directed to a database engine;

initially evaluating at least one system performance characteristic associated with at least one database engine, selected from one or more of:

system management parameters of said at least one database engine, said system management parameters comprising one or more of estimated processor usage, estimated memory usage, input/output resource usage and/or disk resource usage for a system maintaining the database engine to process the query;

a user-access record of said at least one database engine, said user-access record comprising an assigned accessibility right of a user based on a class or category of a user, historical system resource requirements of the user's previous queries and the user's previously evaluated queries; and

the query to determine system usage of said at least one database engine, prior to submission of the query to the database engine, said evaluating of the database query based on one or more of:

a parameter of the query, a number of relational databases for the query, a size of a data field to be searched for the query, an availability of resources of the database engine, a number of relational database tables to be employed for the query, a limitation imposed on a size of a query result set, a number of columns of data to be returned in a query result set, a cost of a similar stored query and/or a number of function calls for the query; and

performing one or more of the following: submitting the query to the database engine with a limit on a number of returns responsive to the query, editing the query, and rejecting the query.

164. (New) The system of claim 163, wherein said receiving further comprises:

receiving the database query from a user.

165. (New) The system of claim 163, wherein said receiving, evaluating and editing are performed by a screening server that intercepts queries directed to a database engine.

166. (New) The system of claim 163, wherein said editing further comprises:

substantially optimizing the query for usage of system resources.

167. (New) The system of claim 163, wherein said rejecting comprises:

offering to provide a portion of a result of the rejected query to the user;

submitting the rejected query to the server; and

providing a portion of the result of the query to the user.

REASON FOR ALLOWANCE

The following is an examiner's statement of reasons for allowance:

Claims 1, 25, 27, 117 are allowable over the prior art of record because the prior art of record fails to teach or fairly suggest initially evaluating operability or performance capability of a database engine prior to submission of a query. Evaluating the system performance or operability characteristics associated with the database engine by evaluating system management parameters, a user-access record, and a database query to determine system usage. Wherein said system management parameters comprising one or more of estimated processor usage, estimated memory usage, input/output resource usage and/or disk resource usage for a system maintaining the database engine to process the query; said user-access record comprising an assigned accessibility right of a user based on a class or category of a user, historical system resource requirements of the user's previous queries and the user's previously evaluated queries; said evaluating of the database query based on one or more of: a

parameter of the query, a number of relational databases for the query, a size of a data field to be searched for the query, an availability of resources of the database engine, a number of relational database tables to be employed for the query, a limitation imposed on a size of a query result set, a number of columns of data to be returned in a query result set, a cost of a similar stored query and/or a number of function calls for the query; and rejecting the query if the system usage surpasses a threshold value.

Claims 28, 48, 50, 140 are allowable over the prior art of record because the prior art of record fails to teach or fairly suggest initially evaluating operability or performance capability of a database engine prior to submission of a query. Evaluating the system performance or operability characteristics associated with the database engine by evaluating system management parameters, a user-access record, and a database query to determine system usage. Wherein said system management parameters comprising one or more of estimated processor usage, estimated memory usage, input/output resource usage and/or disk resource usage for a system maintaining the database engine to process the query; said user-access record comprising an assigned accessibility right of a user based on a class or category of a user, historical system resource requirements of the user's previous queries and the user's previously evaluated queries; said evaluating of the database query based on one or more of: a parameter of the query, a number of relational databases for the query, a size of a data field to be searched for the query, an availability of resources of the database engine, a number of relational database tables to be employed for the query, a limitation imposed on a size of a query result set, a number of columns of data to be returned in a query result set, a cost of a similar stored query and/or a number of function calls for the query; and submitting the query to the database engine if the system usage does not surpasses a threshold value.

Claims 51, 71, 73, 156 are allowable over the prior art of record because the prior art of record fails to teach or fairly suggest initially evaluating operability or performance capability of a database engine prior to submission of a query. Evaluating

the system performance or operability characteristics associated with the database engine by evaluating system management parameters, a user-access record, and a database query to determine system usage. Wherein said system management parameters comprising one or more of estimated processor usage, estimated memory usage, input/output resource usage and/or disk resource usage for a system maintaining the database engine to process the query; said user-access record comprising an assigned accessibility right of a user based on a class or category of a user, historical system resource requirements of the user's previous queries and the user's previously evaluated queries; said evaluating of the database query based on one or more of: a parameter of the query, a number of relational databases for the query, a size of a data field to be searched for the query, an availability of resources of the database engine, a number of relational database tables to be employed for the query, a limitation imposed on a size of a query result set, a number of columns of data to be returned in a query result set, a cost of a similar stored query and/or a number of function calls for the query; and editing the query if the system usage surpasses a threshold value.

Claims 74, 92, 94, 97, 100, 102, 103 and 163 are allowable over the prior art of record because the prior art of record fails to teach or fairly suggest initially evaluating operability or performance capability of a database engine prior to submission of a query. Evaluating the system performance or operability characteristics associated with the database engine by evaluating system management parameters, a user-access record, and a database query to determine system usage. Wherein said system management parameters comprising one or more of estimated processor usage, estimated memory usage, input/output resource usage and/or disk resource usage for a system maintaining the database engine to process the query; said user-access record comprising an assigned accessibility right of a user based on a class or category of a user, historical system resource requirements of the user's previous queries and the user's previously evaluated queries; said evaluating of the database query based on one or more of: a parameter of the query, a number of relational databases for the

query, a size of a data field to be searched for the query, an availability of resources of the database engine, a number of relational database tables to be employed for the query, a limitation imposed on a size of a query result set, a number of columns of data to be returned in a query result set, a cost of a similar stored query and/or a number of function calls for the query; and if the system usage surpasses a threshold value, performing one or more of the following: submitting the query to the database engine with a limit on a number of returns responsive to the query, editing the query, and/or rejecting the query.

Claim 95 is allowable over the prior art of record because the prior art of record fails to teach or fairly suggest initially evaluating operability or performance capability of a database engine prior to submission of a query. Evaluating the system performance or operability characteristics associated with the database engine by evaluating system management parameters, a user-access record, and a database query to determine system usage. Wherein said system management parameters comprising one or more of estimated processor usage, estimated memory usage, input/output resource usage and/or disk resource usage for a system maintaining the database engine to process the query; said user-access record comprising an assigned accessibility right of a user based on a class or category of a user, historical system resource requirements of the user's previous queries and the user's previously evaluated queries; said evaluating of the database query based on one or more of: a parameter of the query, a number of relational databases for the query, a size of a data field to be searched for the query, an availability of resources of the database engine, a number of relational database tables to be employed for the query, a limitation imposed on a size of a query result set, a number of columns of data to be returned in a query result set, a cost of a similar stored query and/or a number of function calls for the query; and transmitting a query to a search engine and receiving one of: a rejection of the query and a revised search criterion, prior to receiving a search result based on the query.

Claim 96 is allowable over the prior art of record because the prior art of record fails to teach or fairly suggest initially evaluating operability or performance capability of a database engine prior to submission of a query. Evaluating the system performance or operability characteristics associated with the database engine by evaluating system management parameters, a user-access record, and a database query to determine system usage. Wherein said system management parameters comprising one or more of estimated processor usage, estimated memory usage, input/output resource usage and/or disk resource usage for a system maintaining the database engine to process the query; said user-access record comprising an assigned accessibility right of a user based on a class or category of a user, historical system resource requirements of the user's previous queries and the user's previously evaluated queries; said evaluating of the database query based on one or more of: a parameter of the query, a number of relational databases for the query, a size of a data field to be searched for the query, an availability of resources of the database engine, a number of relational database tables to be employed for the query, a limitation imposed on a size of a query result set, a number of columns of data to be returned in a query result set, a cost of a similar stored query and/or a number of function calls for the query; and transmitting a query to a database engine and receiving one of: a rejection of the query and a revised search criterion, prior to submission of the query to the database engine.

Claim 105 is allowable over the prior art of record because the prior art of record fails to teach or fairly suggest initially evaluating operability or performance capability of a database engine prior to submission of a query. Evaluating the system performance or operability characteristics associated with the database engine by evaluating system management parameters, a user-access record, and a database query to determine system usage. Wherein said system management parameters comprising one or more of estimated processor usage, estimated memory usage, input/output resource usage and/or disk resource usage for a system maintaining the database engine to process the query; said user-access record comprising an assigned accessibility right of a user based on a class or category of a user, historical system resource requirements of the

user's previous queries and the user's previously evaluated queries; said evaluating of the database query based on one or more of: a parameter of the query, a number of relational databases for the query, a size of a data field to be searched for the query, an availability of resources of the database engine, a number of relational database tables to be employed for the query, a limitation imposed on a size of a query result set, a number of columns of data to be returned in a query result set, a cost of a similar stored query and/or a number of function calls for the query; if the system usage surpasses a threshold value, performing one or more of the following: submitting the SQL query to the database engine with a limit on a number of returns responsive to the SQL query, editing the SQL query, and/or rejecting the SQL query; and monitoring the actual system usage of the SQL query after submission to the database engine.

The dependent claims 2, 4-6, 8-24, 29, 31-47, 52, 54-56, 58-70, 75, 77-79, 81-91, 99, 106-116, 118-139, 141-155, 157-162, 164-167, further limiting to the independent claims, definite and enabled by the specification are also allowed.

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

Conclusion

The prior art made of record, listed on form PTO-892, and not relied upon, if any, is considered pertinent to applicant's disclosure.

Any inquiry concerning this communication or earlier communications from the
examiner should be directed to DEBBIE M. LE whose telephone number is (571) 272-
4111. The examiner can normally be reached on 8:30-5:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's
supervisor, JEFFREY GAFFIN can be reached on (571) 272-4146. The fax phone
number for the organization where this application or proceeding is assigned is 571-
273-8300.

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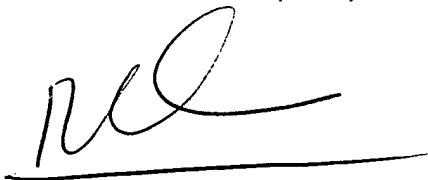
DEBBIE M LE
Examiner
Art Unit 2168

Debbie Le

Nov. 14, 2005.